

TRITON Flat roof mounting system

The aerodynamic TRITON mounting system is an innovative PV mounting system for the use on all flat roofs, whether this is film, bitumen, gravel, green, or trapezoidal sheet roofs.. With the TRITON elevation system, which works without roof penetrations, PV modules are safe, easy assembled in no time. Due to the high degree of pre-assembly, and the modular system, both assembly time and assembly costs are reduced considerably. In a product approved by the wind Technological Society boundary layer wind tunnel, the TRITON system was tested not only on its stability, but also aerodynamically optimized to realize low ballast total systems. . Therefore even roofs with low load reserves can be used wisely for photovoltaics. By using high quality materials, the TRITON system provides an optimal solution for applications where high demands are placed on quality, cost effectiveness and persistence. The outstanding ease of installation and the high degree of pre-assembly speak at an excellent price-performance ratio for itself. The TRITON flat roof system is available in a southern option with 10 ° and 15 ° angle of attack and in an east / west variation with 12 ° angle.



TRITON SOUTH 10°

Your benefits:

- No roof penetration of the roof membrane
- Aerodynamically optimized and ballast low respectively ballast free
- Suitable for all flat roofs in particular with low load reserves
- Excellent ventilation for high outputs
- Very high degree of pre-assembly
- „plug and play“ to assemble easy
- No need of drilling and cutting work on the roof -> Protection of the roof membrane
- Very low measuring expenditure by prefabrication and level pole
- guaranteed water flow in ALL directions
- maintenance walk way between all panel rows (also east/west)
- Building protection mats mechanically secured prevents slipping
- Tool-free basic assembly of the triangles and connectors
- Unevenness on the roof can be compensated
- Free software for quantity and price determination and allocation- and ballast plan
- transport optimized
- Complete metallurgical shielded cable routing ad to the field end incl. panel cable trays. No high binding of the cables necessary cables fully UV protected **
- Simple panel grounding**
- Involvement in lightning protection system possible **
- Integration of a fall protection possible ****

TRITON East/West 12°





Optimized air gap at the south system



Optimized air gap at the east/west system



Ballast tub (optional)



Ballast help (optional)



String cable management with cable tray (opt.)



Module cable management with cable tray (opt.)

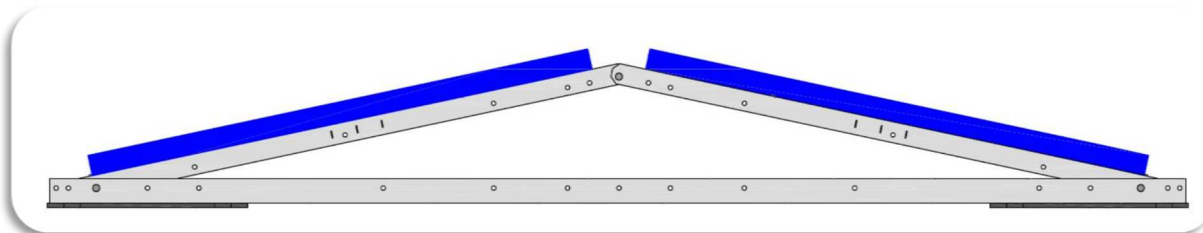


Alu. building protection mat for membrane roofs

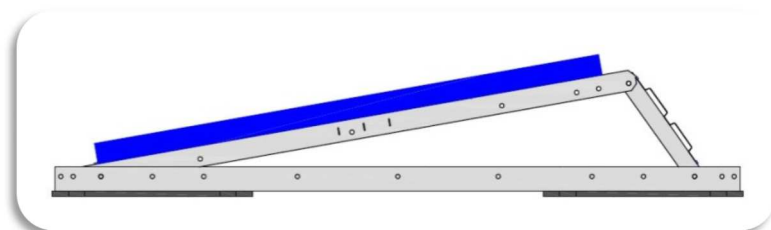


Building protection mat for bitumen and gravel roofs

TRITON East/West :



TRITON South :



Technical specification:

System	TRITON east/west	TRITON south 10°	TRITON south 15°
Angle of attack	12°	10°	15°
Panel width*	970-1.030 mm	970-1.030 mm	970-1.030 mm
Panel length*	1.630-1.690 mm	1.630-1.690 mm	1.630-1.690 mm
Frame height	29-51 mm	29-51 mm	29-51 mm
Weight without ballast and panel	approx. 3,2 kg/m ²	approx. 4,4 kg/m ²	approx. 4,6 kg/m ²
Shade distance	-	any	any
Sprung mass*	2.288 mm	from 1.406 mm	from 1.406 mm
Elevation length	2.216 mm	1.344 mm	1.344 mm
Max. building height	ca. 318 mm	ca. 285 mm	ca. 369 mm
Dist. Manbrane-panel top edge	ca. 102 mm	ca. 102 mm	ca. 102 mm
Max. roof pitch*	5°	5°	5°
Min. distance to the roof edge	0,8 m	0,8 m	0,8 m
Minimum setup*	2x2 E/W panels	2x3 resp. 3x2 panels	2x3 resp. 3x2 panels
Panel setup	horizontal	horizontal	horizontal
Panel fastening	Short side	Short side	Short side
Snow load zone (D)	1-3	1-3	1-3
Wind load zone (D)	1-4	1-4	1-4

- Assumed load after Eurocode 1 (DIN EN 1991-1)
- Boundary Layer Wind Tunnel Test of the I.F.I. Institut in Aachen
- Standard load till 2,4 kN/m²; opt. Heavy load till 4,4 kN/m²
- Materials: S275/355 GD + Z600; S275 MC hot galvanized after ISO 1461; S275 GD galvanized + powder coated, Aluminium EN AW 6063 T66; stainless steel A2-70; BSM: rubber granules with / without aluminum foil Triplex

12 years guarantee

* Special solutions / discrepancies / adjustments possible ** optional *** optional and after verification